INEEL PUBLIC MEETING ON PROPOSED CLEANUP
PLAN FOR IDAHO CHEMICAL PROCESSING PLANT
(INTEC)

TWIN FALLS, IDAHO

Tuesday, November 17, 1998

Nancy Schwartz Reporting 2421 Anderson Street Boise, Idaho 83702 208-345-2773 Fax 208-424-1231 e-mail NSchw208.aol.com

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1 2		1	TWIN FALLS, IDAHO, TUESDAY, NOVEMBER 17, 1998
	PLAN FOR IDAHO CHEMICAL PROCESSING PLANT	2	
3	(INTEC)	3	MR. SIMPSON: Thank you for coming
1		4	tonight. I'm Erik Simpson. I introduced myself to
5		5	you earlier. I'm the community relations plan
6		6	coordinator for the INEEL Environmental Restoration
7		7	Program.
8		8	Really, we're here tonight to talk about
9		9	the Waste Area Group 3 Remedial Investigation and
10	TWIN FALLS, IDAHO	10	Feasibility Study and the proposed plan,
11	Tuesday, November 17, 1998		specifically. And just to give you some
12			background, this is the fifth facility-wide
13			investigation that we've completed out at the lab,
14			and we have four more to go under our Federal
15			Facility Agreement and Consent Order.
16		16	We're here tonight because DOE had
17			thought, since the aquifers impacted due to
18			operations at the Idaho Nuclear Technology and
19			
20		19	Magic Valley would want to be involved during the
21	•		<u> </u>
22		21	comment session.
23	Nancy Schwartz Reporting 2421 Anderson Street	22	So, really, rather than doing a formal
24	Boise, Idaho 83702 208-345-2773		presentation, I'll just leave it up to you guys
25	Fax 208-424-1231 e-mail NSchw208.aol.com		as to how you would like us to present the
		25	information, but it's really your meeting at this
	Pag	ge 2	Page 4
1	PUBLIC COMMENT	1	point. But we will have an official comment
2		2	session for the record where Nancy will record your
3	See Page 57, Line 11	1 2	1 1
4		'	comments verbatim.
1 .		4	DR. RICKARDS: I had heard of a 26-acre
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1 that there will be design constraints placed upon

- 2 the facility and that is, that we want it to have a
- 3 fairly robust acceptance criteria. That is, that
- 4 we'll be able to take soils that may be
- 5 contaminated with some RCRA constituents in the
- 6 facility.
- So we want it to meet minimum technology 7
- 8 requirements of the RCRA, subtitle C, landfill,
- 9 which is double liners, leachate collection
- 10 systems. And the facility will need to be designed
- 11 so that no leachable concentrations from the
- 12 facility over its design life will reach the
- 13 aquifer in concentrations that would result in an
- 14 incremental increase in the risk in the aquifer,
- 15 which it would be a 1 in 10,000 risk level, hazard
- 16 index of one. And it would have to meet drinking
- 17 water MCLs as well, if more conservative, which
- 18 they generally are.
- 19 DR. RICKARDS: But in terms of
- 20 quantities going in?
- MR. RENO: Well, the inventory of what 21
- 22 is going in is, there is some uncertainties in the
- 23 soil volume that we have. We think from the
- 24 Chem Plant that we're going to have on the
- 25 order of 82,000 cubic yards. But once we start
- 1 digging -- I mean, there it's invariable, you find
- 2 things a little bit different when you do an
- 3 excavation and removal remedy that we may find we
- 4 have a little bit less than that. We may find that
- 5 we have more.
- We have generalized ideas on the
- 7 concentrations of the contaminants that are present
- 8 there. The primary risk drivers at the Chem Plant,
- 9 cesium-137 with surface pathways. We have some
- 10 sites down by the 603 facility that have europium
- 11 isotopes that cause a problem down there in the 603
- 12 building. And for the groundwater pathways, it's
- 13 primarily strontium-90 that's our risk driver. We
- 14 know we have some longer-term risks from
- 15 transuranics in the Tank Farm area. That's not
- 16 being addressed under this Record of Decision.
- 17 Those soils would not be candidates for disposal at
- 18 this facility.
- DR. RICKARDS: Is that part of the 19
- 20 cleanup, though? I thought the Tank Farms were
- 21 part of the cleanup.
- MR. JENKINS: What we're talking about,
- 23 as far as the Tank Farm, is that, at this point,
- 24 we're recommending an interim action to eliminate
- 25 the driving force to water, try to turn off the

- 1 infiltration. But at the same time, we're going to
 - 2 actually conduct another study to try to find out
 - 3 how fast the plutonium is moving, how much of it is
 - 4 there, get a better handle on the quantity and
 - 5 concentrations. And that's what we're calling the
 - 6 Tank Farm investigation, OU-3-14. And Scott is
 - 7 right. At this point, that soil needs to be
 - 8 considered for the repository.
 - DR. RICKARDS: Is there any plutonium in
 - 10 what's going in it?
 - MR. JENKINS: There's trace quantities,
 - 12 but there's not "TRU" levels.
 - MR. RENO: Yeah. There's trace 13
 - 14 quantities of plutonium that would be going in.
 - MR. JENKINS: But there's not "TRU"
 - 16 levels.
- 17 DR. RICKARDS: So are you going to
- 18 follow the 100 nanocuries standard?
- 19 MR. JENKINS: It would be less than 10.
- MR. RICKARDS: Less than 10, but in 20
- 21 terms of quantity, like how many billions of
- 22 particles? You don't have an estimate?
- MR. JENKINS: We don't have an estimate. 23
- DR. RICKARDS: Even gramage or 24
- 25 curieage?
- Page 6
 - MR. JENKINS: No. I would have to go
 - 2 back and actually pull the data up to see what each

Page 8

- 3 site has.
- AUDIENCE MEMBER: I know that we're not
- 5 dealing with final solutions in the Tank Farm, but
- 6 if that involved digging up soil, which I don't
- 7 think is very likely, that soil would not go into
- 8 the soil repository, this one here?
- MR. JENKINS: At this point, we're not
- 10 considering it candidate soils. And let's say that
- 11 one of the alternatives evaluated would be to dig
- 12 it up. We do know that there's places within the
- 13 Tank Farms, the soils in there did have quantities
- 14 or concentrations of actinides, plutonium in
- 15 particular that are over the 100 nanocuries stuff,
- 16 so it can't go there anyway. It would have to go
- 17 to WIPP.
- But stuff less than 10, it depends on 18
- 19 what our criteria becomes. And the criteria is not
- 20 driven by the Tank Farm. The criteria is to be
- 21 mainly driven by protection of the aquifer. So
- 22 we're basically going to have to go back, calculate
- 23 what an acceptable source mass, or, if you want to
- 24 think of it that way, would be acceptable within
- 25 the repository.

Page 9 DR. RICKARDS: The thing on the 1 2 situation was legally, you could take less than 3 100 nanocuries transuranics from the Tank Farm, 4 putting in this official RCRA endorsed low-level 5 dump; right? 6 MR. JENKINS: RCRA compliant. DR. RICKARDS: I mean, it's real legal 8 to just sort of postponing that decision? MR. JENKINS: We could take the less 10 than 100 if the concentrations from that 11 material -- if it leaked -- leached to the 12 aguifer -- did not present an unacceptable risk. DR. RICKARDS: I agree with what you're 13 14 saying. I'm just pointing out that the official 15 dump you're opening legally can take the stuff from 16 the Tank Farm, mix it with cement or whatever the 17 grounding procedure usually is and do that. But the alternative that I want always 19 studied is the above-ground containment. 20 Basically, I want you to include in your impact 21 statement and scoping studies the Nevada study that 22 came out last year on the transportation of 23 plutonium into the water supply. The actual 24 individual doses of plutonium if inhaled, 25 resuspended, pumped up, integrated, and inhaled. I

1 think, if you study it correctly, you will see that

2 containment above ground in barrels not only 3 provides jobs for the INEEL, but it is the total

4 best way to contain it. It seems to me you're 5 always in these clean-up projects delaying the

6 time's use of the 240,000 plutonium by legally

7 putting it in dumps. And that's why I have been

8 trying to ban the reburial of plutonium. But you, 9 literally, are, with this project, opening a legal

MR. RENO: Just a quick question, I

13 low concentrations of plutonium isotopes, well less

16 some cesium, strontium contaminated soils, just to

19 a small amount, trace amount of cesium would be

DR. RICKARDS: A microscopic view of it,

12 guess. You know, we have a lot of soils at very

14 than the nanocurie range, down in the picocurie 15 range. Is there a threshold amount that, if we got

17 clarify, that you think might be an acceptable --

20 reasonable to be buried. But what I have been

21 asking from the beginning of the programmatic

22 impact statements on waste management at the 23 scoping end is to quantify the total end result of

24 what you reburied if you approach everything at

10 dump for plutonium.

11

18

Page 11 1 100 nanocurie reburial rate. And the Pit 9 2 Record of Decision, they put into the one-acre 3 pit a 10 nanocurie concentration and estimated 4 3 to 4 pounds for the plutonium, not the soil, but 5 plutonium itself, which is literally millions, if 6 not billions of particles in each pound right back 7 into one pit. And now you're talking about a 26 8 acre, less than 100 nanocurie of plutonium pit, and 9 that's where, to me, the whole goal of the EPA law 10 is to study the big picture first. And when you 11 open the 26-acre plutonium dump, low level as it 12 may be, it is better in the long run to simply 13 contain this material in barrels, at this point 14 they estimate 400 years, at which point you can 15 rebarrel them. It is cheaper. It just takes so 16 little inspection to keep this stuff above ground. 17 What I think you-all are is in denial of that 18 eventual end point. You are systematically looking 19 for closure on these cleanup projects as opposed to 20 admitting that we have to contain this material above ground. 21 22 MR. RENO: Okay. Comment accepted. 23 I am curious, though, maximum 24 concentration of plutonium isotopes that is in the 25 detected concentration in these 82,000 yards that

25 perfect place to have a 200-acre plutonium dump

Page 10

1 we're proposing for burial in the repository, do we 2 have that off the top of our head? I think we are 3 well below the nanocurie range for all of these 4 82,000 yards --DR. RICKARDS: That's actually what I'm 6 asking you, for the total quantity. Are we talking 7 about a quadrillion of plutonium particles or are 8 we talking about 10 plutonium particles? MR. RENO: The answer, again, is not the 10 one you want. We don't have that number, but we 11 are seeing that the design criteria -- we could get 12 that number. But the design criteria would be to a 13 risk-based standard. And the drinking water MCL is 14 15 picocuries per liter, which by the time you 15 incorporate the daughter products, 239 is about 16 seven-and-a-half picocuries per liter, and then the 17 daughters would take it to 15 picocuries per 18 liter. So that would be our founding criteria. 19 DR. RICKARDS: This, to me, is the whole 20 problem with piecemealing the whole situation. And 21 even in the big picture, if every radionuclide 22 leaked that was there, it would meet federal 23 standards because the aquifer is so large. And the 24 big picture is that's why they view INEEL as the

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25 this 10 nanocurie reburial rate, or the legal Nancy Schwartz Reporting 208-345-2773

1 that they talk about is their eventual goal.

Literally, our water supply is large,

3 but the medical view of radiation is to -- the less

4 human-added exposure the better, and with zero

5 being the safest limit. And we have a chance to

6 contain all this material, and yet you're going

7 through calculations you know will allow you to

8 rebury it. That's my problem with the whole

9 cleanup. You actually let it leak and it still

10 meets your standards. That's why mixing it with

11 cement is acceptable to you and putting it over

12 the water supply is acceptable to you.

INEEL STAFF: I might add that not 14 everybody would agree that things up above ground

15 is a safer configuration. It's subject to fire,

16 floods, personnel exposure doing inspections. So

17 if you integrated exposure over time, it's going to

18 be much greater than that which is buried, and they

19 have no exposure pathways.

13

DR. RICKARDS: But they actually have 20

21 never done those calculations. In the Pit 9 Record

22 of Decision, they make that statement. And they

23 say that storing it above ground would pose a

24 radiological risk to the workers' community and the

25 environment. When I asked them to produce those

1 risk assessments, they admitted in writing that 2 they had never done them.

Once again, they're dismissing the best 4 alternative here verbally and in writing and in the

5 records for calculations they have never done.

6 These folks are supposed to be the waste management

7 experts, and now they're saying there is such risk

8 to managing these wastes that we can't keep them

9 above ground.

AUDIENCE MEMBER: No, I didn't say that, 10

11 Peter. What I said was that the risk would be

12 greater if it's above ground.

DR. RICKARDS: That there is a great 13

14 risk to that, greater risk to that.

INEEL STAFF: Above ground?

DR. RICKARDS: Above ground. And 16

17 you-all are supposed to be the waste land

18 experts. I'm saying that's what are you saying.

19 You've never documented it.

20 You're saying I misrepresented you.

21 That's why -- agreeing with you now. But what you

22 are saying is there's a greater risk to storing it

23 above ground. And I'm saying you, in writing,

24 have said that, but you have, in writing, admitted

25 you never did the risk assessment. And it

1 contradicts -- it contradicts what your speech

2 teams say, that you are the waste management

3 experts and we can bring in high-level fuel rods

4 from around the world indefinitely with no Yucca

5 Mountain open or potentially open and store them

6 indefinitely here. And, yet, you just got through

7 saying that there is a greater risk to storing

8 above ground. And I'm asking you to document it.

INEEL STAFF: Well, those are two

10 different things. The fact that it's greater

11 doesn't mean we can't manage it. But we still --

12 we've got tremendous years of experience there. We

13 have the controls to do that. But when you say,

14 "Which poses the greatest risk?" then, whether the

15 Pit 9 people have done calculations or not, they

16 could be done if many more potential accidents that

17 can happen, things when they are above ground than

18 they are when they are 10 feet under ground. And

19 if you want to worry about inhalation risk from

20 plutonium, a fire would be -- take Rocky Flats.

21 There is nothing under ground that would compare to

23 DR. RICKARDS: But in the new RCRA

24 buildings are there not good fire controls?

AUDIENCE MEMBER: There are, and we take

Page 16

Page 14

16

1 great pains to do that, but there is still that 2 potential.

3 AUDIENCE MEMBER: So earth and burn.

MR. SIMPSON: David, I know you had some 4

5 issues that you wanted to discuss, some questions.

MR. KIPPING: Sure. On Group 1 on the

7 Tank Farm, it's quite clearly stated that what is

8 proposed is the interim solution that for about

9 the next six years until -- until, I guess, the

10 decision will be made in 2004. And so we're

11 talking about something being done in the next six

12 years, although the facility will be operational at

13 least until 2015. It seems to me that the

14 interim solution of trying to minimize the water

15 contamination seems like a reasonable approach.

The two things I'm concerned about is,

17 number one, the Tank Farm is by far the largest

18 amount of contamination, the biggest problem, and

19 it deserves a very, very careful look. And so I

20 want to make sure that there is an environmental

21 impact statement prepared, I think, which is a

22 little more extensive, deeper document than these

23 two set of plans, and have plenty of chances to

24 take a look at that. That is the major

25 contamination of all of INEEL. So very

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1 interesting, the schedule, apparently, that is not 2 going to happen for a number of years.

The second concern is the interim

4 solution is, in essence, capping it, putting some

- 5 dirt on it, bury it. That's the first step.
- 6 Question: Is that going to be the first step
- 7 towards a defacto cap and fill approach? It's not
- 8 at all clear that that's the right thing to do for
- 9 the Tank Farm and to leave the soil in place,
- 10 capped over. Peter pointed out there are a lot of
- 11 problems with that.
- So I'm very concerned that the interim
- 13 solution will turn out, migrate into the final
- 14 solution. You made it very, very clear that this
- 15 is merely an interim solution and does not in any
- 16 way affect whatever the final solution will be
- 17 made.

6 there.

13

14

15

18

23

22 closure.

8 process right now?

12 November next year.

17 calcining them --

- 18 MR. JENKINS: I'll take that one. The
- 19 first thing was, you talked about more in-depth,
- 20 detailed analysis than this. What the proposed
- 21 plan, the 54 pages or whatever it is, is really a
- 22 summary of that document sitting over there.
- MR. KIPPING: 3,000 pages. 23
- 24 MR. JENKINS: Is that what it is? It's
- 25 a lot. That actually is an evaluation of all the

1 sites, the 95 sites that we talked about in this

2 investigation. Currently, there is an EIS going on

3 to try to determine what they're going to do with

4 the waste in the tanks, how they're going to treat

MR. KIPPING: Where are we in that

10 draft will be issued in April for public review and

11 comment. And the final schedule will be out in

MR. LOCKIE: The draft in April.

16 contents of the tanks, what to do with them,

19 looking at is how to treat the waste, what to do

21 of looking at the whole of the Chem Plant for a

24 as far as trying to make a final decision on the

20 with the tanks, how to close down facilities, kind

And one of the big issues that we had,

25 Tank Farm, was we didn't know what was going to be

AUDIENCE MEMBER: But that's the

MR. ROSE: The draft is under way. The

AUDIENCE MEMBER: The draft in April?

MR. JENKINS: Under that EIS, what we're

5 the waste. I think there is notes in the back

1 left behind. So what our intent is, is to collect

- 2 field data, continue our investigations that it
- 3 talks about, that we would make this decision in
- 4 around 2004.
- Leading up to that, we would take
- 6 whatever comes out of the decisions on the EIS.
- 7 plus whatever field data we get and make an
- 8 integrative decision, and we would look at anything
- 9 from no action, capping in place to a full
- 10 retrieval of the soils and disposal. Some of it
- 11 could end up going to WIPP, for instance. Some of
- 12 it could end up at various other locations.
- 13 AUDIENCE MEMBER: I'm a little
- 14 confused. EIS on the Tank Farm is coming out in
- 15 the draft in April of '99?
- 16 MR. JENKINS: The EIS is, yes.
- AUDIENCE MEMBER: What is the title of 17
- 18 this EIS?
- 19 MR. LOCKIE: High-level waste and
- 20 facilities disposition.
- AUDIENCE MEMBER: You mentioned another 21
- 22 date like in 2004.
- 23 MR. JENKINS: 2004 is another CERCLA
- 24 investigation, another RI/FS.
- AUDIENCE MEMBER: That is an

Page 18

- 1 investigation of what?
 - MR. JENKINS: The Tank Farm soils.
 - 3 AUDIENCE MEMBER: This is my confusion.
 - 4 The EIS coming out, that will deal with the Tank
 - 5 Farm?
 - MR. JENKINS: It will deal with the
 - 7 tanks, the contents of the tanks and how to close
 - 8 the structure, the tanks and the concrete
 - 9 structure. It's not making a decision on what to
 - 10 do with the soils.
 - AUDIENCE MEMBER: To deal with the
 - 12 Tank Farm in it's entirety is a two-step process?
 - 13 MR. JENKINS: Yes.
 - 14 AUDIENCE MEMBER: Step No. 1 is to deal
 - 15 with the contents of the tanks and the tanks'
 - 16 plumbing, et cetera, and then once you decide what
 - 17 to do with that, then you deal with the soils?
 - 18 MR. JENKINS: Then we deal with the
 - 19 soils on top of that.
 - MR. RENO: The plans need to be 20
 - 21 integrated.
 - 22 MR. JENKINS: Now, as far as answering
 - 23 the second part of your question about what we're
 - 24 proposing as to seal the surface or whatever, for
 - 25 lack of a better term, get the water off of there.
- Nancy Schwartz Reporting 208-345-2773

1 Yes, that's what we're proposing for the short

2 term. In all likelihood, what we're talking about3 is continuing that until we can take a final action

4 on the Tank Farm. But that's not going to prevent

5 us from -- if the decision is made to dig it up, it

6 won't prevent that. We would give it an objective

7 evaluation.

8 MR. RAUNIG: Talley, could you 9 explain, give them a little more background

10 because I don't think he realizes the amount of

11 investigation that's already gone on in the Tank

12 Farm, let him know that we have performed risk 13 assessments. We have done several studies, and

14 there has been a lot of thought put into it

15 already.

MR. JENKINS: Right. As Dennis said, 17 we have done several investigations within the

18 Tank Farm. But we took the data we had

19 previously -- for this investigation, we took

20 previous data plus used process knowledge, knowing

21 how big the releases were and what concentrations

22 were in the liquids and calculated risk based off

23 of that. But one of the issues we had was how fast

24 was plutonium moving, how fast was strontium

25 moving, what do we need to do, either keep it in

Page 22

1 the soils or dig it up or stabilize it, for

2 instance.3 We didn't have a real good handle on the

4 range of costs or the impacts, I guess, is the best

5 way to say it, in that a lot of -- we didn't know

6 where the EIS was headed, and we still don't know 7 what the answer there is. We don't know what the

8 decision is. So we're really trying to wait until

9 they make a decision so that we can add that plus

10 the soils together to make a final decision.

DR. RICKARDS: I take any bets that they
put cement into the tanks, and leave it there.

13 Just a guess.

MR. RENO: Well, a separations

15 alternative is one of the alternatives being

16 evaluated or is going to be evaluated in the EIS.

17 DR. RICKARDS: Is the mixing in place

18 and leaving it there an alternative that's being

19 assessed?

20 MR. ROSE: Leaving some source term

21 behind in the tanks is an alternative, all the way

22 from between that and actually ripping the tanks 23 out of the ground. So that's the tough balancing

24 act. If a decision is made on how much source term

25 to leave behind in the tanks in the facilities,

21

1 that has to be added in with what's left behind in

2 the soils, if anything. Which part do you get a

3 greater share?

4 MR. JENKINS: For instance -- and this

5 is purely hypothetical. For instance, if we were

6 to leave something behind in the tanks that has

7 been grouted up, it may drive us to additional

8 remediation on the soils, either an excavation or a

9 stabilization in place such that the total impact

10 to the aquifer from both pieces still is not

11 unacceptable.

MR. RAUNIG: Keith, when you talk about

13 leaving things in place, you're not talking about

14 leaving the liquid in the tank. You're talking

15 about emptying the tank, rinsing the tank, then

16 whatever residual sediments might be listed.

MR. ROSE: As the closure plans are

18 worked out on those tanks, you can go anywhere from

19 leaving some source term behind to doing a

20 risk base type of closure versus completely

21 cleaning everything out of the tank. And, of

22 course, if the decision is made to leave something

23 behind, that eats up part of the amount of source

24 term that could be left behind in the soil and

25 still balance out a risk base.

Page 24

1 MR. NITSCHKE: Not necessarily. The

2 release rates may not coincide in time so they may3 not be directly added -- we would have to check.

4 MR. ROSE: A cumulative of.

5 AUDIENCE MEMBER: If you look at Item 7

6 on the tank, I mean, I think that gives us a flavor

7 of the possibilities. It's basically the same 8 problem.

9 AUDIENCE MEMBER: What page is that?

10 AUDIENCE MEMBER: It's Group No. 7.

11 It's a tank. It's on page 43. I think it's not 12 really fruitful to discuss what to do with the

13 Tank Farm and the final solution. That's what EIS

14 is about. My concern is that that EIS happened and

15 we're not to gain --

16 MR. JENKINS: And that's the whole

17 intent, is not to come up with a prejudiced

18 decision.

19 AUDIENCE MEMBER: That will be dealt

20 with in the two-step process.

21 MR. RENO: We will be back out for

22 public comment under review once we completed the

23 RI/FS and prepared a proposed plan as to what to do 24 with those soils for final solution.

25 DR. RICKARDS: Are they going to cap

Nancy Schwartz Reporting 208-345-2773

Page 25	11	EEL Public Meeting, INTEC	Conde	nse	It! ''' Twin Falls, Idaho, 11/16/98
2 MR, IAMES: What we're proposing? 3 We're required to reduce the infilitration by 4 80 percent. I don't think we should prejudice the 5 remedial design to cap or cover. The real intent 6 is to reduce the infiliration and to decrease the 7 driving force on escaped contaminants in the soil 8 in that vicinity in the Tank Farms. 9 DR, RICKARDS: And that's 80 percent 10 reduction of rainfal? 11 mR, IAMES: And that's 80 percent 12 runoff. 13 DR, RICKARDS: Is the Tank Farm itself 14 the source of most of the liquid coming up? 15 MR, IAMES: The Tank Farm itself is not 16 particularly the source of liquid. The liquids 17 come from the perc ponds, the various 18 sonthibutions. Scott probably knows the most 19 about the distribution of liquids. 10 DR, RICKARDS: I thought the Tank Farms 21 were leaking some. 22 DR, RICKARDS: I thought the Tank Farms 23 were leaking some. 24 DR, RICKARDS: Are they all sealed now? 25 MR, RIND: There have been leaks from 26 the principal from the valve boxes. 26 DR, RICKARDS: Are they all sealed now? 27 MR, RIND: There have been leaks from 28 he piping from the valve boxes. 29 DR, RICKARDS: Are they all sealed now? 20 MR, RICKARDS: The road ware of any 21 think, October or November of late "72,1 think. 22 mR, LENKINS: For instance, the biggest 23 mR, ROSE: The way those spills have 24 then the other large one was about 3600 gallons 25 that basically was from — over a 21-year period 27 ourse, you remove a lot of the soils and you find out 28 bout those leaks if they were underground? 29 MR, LENKINS: For instance, you would 31 mR, LENKINS: For instance, you would 32 mR, LAMES: Sometimes alarms go off. 33 mR, RAUNINC: The value locks, you know, 34 the throad of the NOR consent order a few years 35 deals and built up a body of contaminants in those 36 ompliant lined. The tanks themselves are not. 36 mR, RENO: All those lines were 37 upgraded under the NOR consent order a few years 38 QR, So they are all double contained, RCRA 39 compliant lined. The tanks themselves are not. 40 AUDIENCE MEMBE]	Page 25		Page 27
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5 remedial design to cap or cover. The real intent 6 is to reduce the infiltration and to decrease the 7 driving force on escaped contaminants in the soil 8 in that vicinity in the Tank Farms. 9 DR RICKARDS: And that's 80 percent 10 reduction of rainfall? 11 MR. JAMES: Rainfall and snowmelt, 11 PRINCE MEMBERS: Since when? 12 runoff. 13 DR. RICKARDS: Is the Tank Farm itself 14 the source of most of the liquid coming up? 15 MR. JAMES: The Tank Farm itself is not 16 particularly the source of liquid. The liquids 17 come from the pere ponds, the various 18 contributions. Scott probably knows the most 19 about the distribution of liquids. 18 contributions. Scott probably knows the most 29 MR. RICKARDS: 1 thought the Tank Farms 21 were leaking some. 2 MR. RICKARDS: Are they all sealed now? 2 MR. RENO: There have been leaks from 23 the piping from the valve boxes. 2 MR. RICKARDS: Are they all sealed now? 2 MR. RENO: We're not aware of any leaks 4 in the tanks either, are we? 5 MR. ROSE: No. 6 MR. JAMES: We're not aware of any leaks 4 in the tanks either, are we? 5 MR. ROSE: No. 6 MR. JAMES: We're not aware of any leaks 8 in the tanks leither, are we? 5 MR. ROSE: No. 6 MR. JAMES: We're not aware of any leaks 9 leaks and built up a body of contaminants in those 10 soils. 1 AUDIENCE MEMBER: We've had some past 9 leaks and built up a body of contaminants in those 10 soils. 1 AUDIENCE MEMBER: How did you find out 12 about those leaks if they were underground? 11 MR. JAMES: For instance, you would 14 transfer so many gallons from one building, and it 15 never arrived, or transferring liquid from one tank 16 to another, and it didn't arrive. 17 mR. JAMES: We're not aware of any leaks 9 MR. RAUNIG: The value locks, you know, 19 there is always some alarm. 20 MR. RENO: All those lines were 21 upgraded under the NON consent order a few years 22 ago. So they are all double contained, RCRA 21 upgraded under the NON consent order a few years 22 ago. So they are all double contained, RCRA 23 compliant lined. The tanks themselves	3	We're required to reduce the infiltration by		3	Anyway, in the course of operations in
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25 vaults? I thought they were. 25 process with spills are equivalent to the NEPA					
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19 NEPA documentation of an EIS.

24 public documents that deal --

20

25

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Page 29 1 process. There will be a new Remedial 3 Investigation and Feasibility Study. That will go 4 into an administrative record. It will be 5 available for public review. We'll issue a 6 proposed plan with a preferred alternative, and 7 then there will be an opportunity for public 8 comment that occurs in conjunction with the CERCLA 9 process. 10 MR. JAMES: We discussed that during the 11 informal part of the meeting. Is it true that 12 there is no longer any controversy about CERCLA 13 being the functional equivalent of NEPA? Because 14 EPA is really the subject matter expert in that. 15 There's no longer any controversy, is there, Matt? MR. WILKENING: Not from Superfund's 17 point of view. We've always considered ourselves 18 to be an RI/FS, to be functionally equivalent to a

AUDIENCE MEMBER: So there will be

21 two -- the available document and then the one from

22 later, which will be different formats for

MR. WILKENING: Yes.

23 different bureaucratic reasons but are formal

1 calcination; some do not. AUDIENCE MEMBER: The calciner, I 3 wouldn't put a lot of money in it. MR. LOCKIE: It certainly has some 5 difficulties if we permit it in the future. AUDIENCE MEMBER: I'm done with my 7 thoughts and comments and questions on the Tank 8 Farm. DR. RICKARDS: I was just curious, the 10 soils under the building, that's sort of totally 11 different from the Tank Farm situation. And then 12 quantity-wise, I mean, it just seems like you're 13 not going to excavate those because the Chem Plant 14 is there to stay, it seems. And quantity-wise do 15 we have any quantity of what those materials amount 16 to? Are you going to look at stabilizing them, or 17 what are you looking at? 18 MR. JENKINS: We have four sites under 19 the buildings group. The first one is, basically, 20 under the 603 complex on the dry side. That was an 21 old French drain or dry well where basin and 22 recirculation water was disposed of periodically. 23 It operated from like '57 to '66, I think, 24 somewhere in that time frame. Another one -- we have two under the 604

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AUDIENCE MEMBER: One other question on 2 the Tank Farm. Currently, the waste in the Tank 3 Farm is being run through the calciner and EPA has 4 its own problems in terms of things. Will the EIS 5 deal with the calciner? Where does the calciner 6 fit in? Where does it fit in? MR. LOCKIE: The high-level waste, the 8 EIS, evaluates a range of alternatives to process 9 the remaining liquid in tanks. Some of those 10 alternatives include calcination, but some don't. AUDIENCE MEMBER: So the April EIS, one 11 12 of the alternatives will be use the calciner, and 13 there are the problems with the calcine. And another alternative might be not to 14 15 calcine, which implies the calcine can be torn 16 down. 17 MR. LOCKIE: Correct. And that process, 18 again, is due to wrap up -- the final EIS 19 distribution in November of '99 and a Record of

20 Decision soon after that. We're currently under

23 or to close the calciner unit. This chart just

25 be included in the BIS. Again, some include

21 constraint order to make a -- for the department to

24 shows some of the range of alternatives that will

22 make a decision by June of 2000 whether to operate

Page 32 1 with the PEW system. One was where we found liquid 2 underneath the steel liner in one of the hot 3 cells, and it may or may not have leaked to the 4 environment. We assessed it as if it had. And then when they were doing a life 6 safety upgrade, putting a fire exit underneath the 7 604, kind of a tunnel type thing, they dug through 8 some contaminated soil there. Then we have a 9 release under 601. That was basically a steel line 10 that corroded away, and it transferred acidic 11 solutions. We have a pretty good handle. We know 12 about roughly 550 curies where it leaked to the 13 environment from that release. In the case of what to do with them, 15 this is one of the issues -- this is one of the 16 issues that's kind of really linked to the EIS. We 17 don't know what D&D -- which, and the facility 18 disposition part of the EIS -- we don't know what 19 the decision will be to do with those three 20 buildings. 21 So, really, what we're talking about is 22 a deferred action. And the facility disposition 23 stuff could be anywhere from complete removal of

24 the building to entomb it in place. I tomb it,

25 into concrete, for lack of a better analogy. What

9

10 ground.

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1 we looked at was three alternatives. No action, 2 again, for comparison. But we looked at placing a 3 cap or containment structure, multi-layered cap 4 over the release site following D&D if the building 5 is left behind. And Alternative 3 is really

6 7 Alternative 2, if the building stays in place. 8 or if the building is removed, we would excavate 9 the soils and dispose of them at the repository if 10 it's constructed.

MR. RENO: Or another suitable facility, 11 12 if it's not constructed.

DR. RICKARDS: But right now we're using 13 14 the Chem Plant to store all the fuel there, aren't 15 we?

16 MR. JENKINS: Yes.

MR, LOCKIE: That 603, you mean? 17

DR. RICKARDS: Yeah. 18

MR. LOCKIE: The fuel is being 19

20 transferred out of 603 to a newer fuel storage.

MR. JENKINS: This is the dry side, 21

22 though, Keith.

MR. LOCKIE: Oh, the dry -- I'm sorry. 23

DR. RICKARDS: So you're talking about 24

25 sectioning part of the building from D&D, then?

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1 decision to do with building is. If the decision

MR. JENKINS: Depending upon what the

MR. RAUNING: Your point about

2 above-ground monitor and retrieval storage, that's 3 what they are doing with the Three Mile Island

4 fuel. And that facility has been a well-engineered

5 concrete pad and then highly rigorous concrete

7 right here (indicating).

15 load and unload easily.

24 being studied?

6 containers to put them in, and that is in this area

AUDIENCE MEMBER: Above ground? MR. RAUNING: Above ground, all above

MR. RENO: That fuel is supposed to be

MR. RAUNING: Little silos that you can

DR. RICKARDS: I guess I just want to

18 mean, the list goes to plutonium-239 and through

20 building group. I was a little confused there, but 21 it does look -- since you're moving the stuff out

17 stress for the scoping, again, to quantify -- I

19 the whole gamut, there, of the soil under the

22 of the wet area, so to speak, that you couldn't

23 actually go down and excavate the soil. Is that

12 ready for shipment out of state by 2035 under the

13 settlement agreement, all that fuel.

2 made under the EIS is to take the building away, we

3 dig up the soil. But we don't know what the

4 decision is going to be made.

In the case of Keith, he is really doing 6 the staff work, the analysis -- or is involved in

7 the analysis. The actual decision on what will be

8 done with the waste and what will be done with the

buildings may be on plutonium.

MR. RENO: We will close them as a 10 11 landfill. If the D&D program, if they employed it

12 on itself and close it in place and grouted up.

Those decisions have not been made. The 13 14 state has some involvement in what is acceptable to

15 us and a lot of these facilities, the RCRA status

16 facilities in particular, we have tremendous say

17 over how those closures may or may not occur.

18 And in the event that there needs to be 19 a clean closure at the interim status facilities.

20 these facilities need to be completely dismantled

21 and taken to a disposal facility somewhere else,

22 and if those are exposed, we will excavate them and 23 remove them.

Over the interim, we believe that the 25 facilities themselves are providing the functional

MR. RAUNING: That is one of the 2 forthcoming. Those basins are going to be shut 3 down and the fuel has been -- as you're probably 4 aware, going to be transferred out. DR. RICKARDS: I guess I really don't 5

6 know, where is the dry storage taking place? MR. RENO: It's on the west side of the 8 603 building. There is a graphite fuel storage

9 facility there. It's indoors.

This is our 603 building and the three 10 11 storage pools are here (indicating) and go north 12 like this. This structure that comes out here to

13 the west is the Graphite Fuel Storage Facility. MR. RAUNING: You can see the slight

14 15 difference in the shading.

MR. JENKINS: You might point out where 16 17 the other ones are, too, the other locations for

18 dry storage.

19 MR RAUNING: This is the 749 fuel 20 storage area. And those are concrete-lined steel

21 silos in the ground. And this is the FAST-

22 Facility, and that's a basin storage area and then

23 the product storage of uranium.

MR. JENKINS: You might want to point 24 25 out where they're building the new --

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1 equivalent -- the word, again, but of a cap, that 2 is, is preventing infiltration of precipitation

3 through the buried wastes or the subsurface waste.

MS. STEWART: My comment on the whole Group 2 is this seems -- to even consider it seems premature. We're kind of putting the cart before

7 the horse. We're making decisions now on how the 8 soils are going to be dealt with when no decision

9 has been made and how the building is going to be

10 dealt with. It seems to me the logical thing to do

11 is to decide what's to be done with the building,12 probably on a case-by-case basis. What are we

13 going to do with 603? Are we going to tear it

14 down? Cap it over? Take the pieces away,

15 whatever? And then having made that decision,

16 we'll have -- we can say, "What are we going to do

17 about the soils?"

18 It's not clear that even if the building

19 is dismantled completely and taken away, that all 20 buildings will be dealt with -- the soil will be

21 dealt with in the same way. So, if I were doing

22 it, I would just strike Group 2 from the plan

23 entirely because, in fact, no decision has been

24 made. You're saying that when some other decision

25 was made, we're going to apply this decision we've

I done as a result of this decision. I mean, if we

2 accept the recommended alternative, what is going

3 to happen? The answer is, absolutely nothing until

4 some other things happen. And if we tear the

5 building down, haul it away, it's not clear that

6 digging up the soil is the right thing. Maybe

7 entombing it and capping it is the right thing.

8 That's not clear. They're related items. You

9 can't make a decision like that. So we're making

10 decisions which could be wrong decisions.

MR. RENO: We do have mechanisms in the future for amending the Record of Decision or

13 issuing an explanation of significant difference,

14 but I'm not disagreeing with your comments.

15 MS. STEWART: I would recommend

16 on Group 2, giving it, to accept the

17 No Action Alternative and that would be --

18 MR. RENO: We need to defer to the

19 decision, I think, is what you recommend.

20 MS. STEWART: That is the fact of what 21 it is. Then when one decides how to dispose of the

22 building, then the soils --

23 MR. JENKINS: Then pick it up again.

24 MR. RAUNING: I just want to clarify

25 that we wouldn't call it a No Action because a

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1 made now. That doesn't make any sense.

2 MR. JENKINS: I guess my answer for that 3 is, you're correct, in that this is one that we

4 have struggled with. How do you make a decision, a

5 cleanup decision, that you can't implement until

6 some other program has done their part? And we've

7 struggled with that.

8 AUDIENCE MEMBER: You don't.

9 MR. JENKINS: We're struggling with

10 that.

11

MR. RAUNING: And also we know it's a

12 release and we can't ignore it, so we need to

13 formally keep it into the CERCLA process so it 14 does get dealt with and doesn't get lost in the

15 shuffle. So it's a way to make sure that the site

16 is addressed eventually.

MR. RENO: And then the real crazy

18 option, of course, especially for a site that is

19 underneath the dry fuel storage area, say, we'll 20 move the building right now so we can go after it.

21 Of course, that's -- and probably not the smart way

22 to do business either, but your comment is noted,

23 and we appreciate you --

24 MS. STEWART: The alternative is the No

25 Action Alternative because no action is going to be

Page 40

1 No Action means we don't have a risk there, and

2 this still could present a risk.

DR. RICKARDS: I unfortunately have to

4 go to a hog meeting, Erik. Are you still following 5 the agenda?

MR. SIMPSON: What is a hog meeting?

DR. RICKARDS: One's coming to Twin so I 8 have to go. But in terms of the scoping meeting, I

9 do want to thank you all for coming to Twin. The

10 crowds, nobody comes to anything.

But at any rate, the Nevada study -- you

12 talked about studying the mobility of plutonium and

13 everything. In what terms -- the only reporter I

14 got to ask you-all about, that was Tim Jackson, and

15 the comments might have been from Alan Jines, is

16 that it's different. The plutonium down there was

17 different, therefore it doesn't count.

18 That is always why they have said they

19 can rebury the plutonium to bind with clay. In the

20 Nevada study, it was bound to the clay and 21 submicron particles floating in sediment in the

22 water. So to me, it fits every principle you've

23 ever said. It does bind to clay. To me it's proof

24 that it is mobile, proof that we shouldn't bury

25 it.

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So one of the things -- I'll give you 1

- 2 your answer in a second -- but to make sure my
- 3 scoping questions are officially in, is the
- 4 individual effects of individual particles, these
- 5 materials resuspended, all of the radionuclides,
- 6 but the CDC group that I'm in definitely doesn't
- 7 appreciate the inhalation, even a single particle
- 8 to the doctors that come to present their
- 9 information to us. And, basically to, one, study
- 10 that on the impact of your results because, I mean,
- 11 basically, it seems to me they are picking it up,
- 12 moving it to a new location in the soil or leaving
- 13 it where it is, and since your alternatives are the
- 14 same, it's probably better just to leave it where
- 15 it is. But at any rate, what are your comments on
- 16 the Nevada study?
- MR. RENO: I guess they were not
- 18 specific to that study, but more how contaminates
- 19 and transport issues are related to our Tank Farm
- 20 investigation. We will look at that study. There
- 21 is also some other work that's being done by
- 22 Clemson, which indicates that under some conditions
- 23 facilitated transport of plutonium may occur. That
- 24 is mode of transport. And that under some
- 25 conditions plutonium may be moving a little bit

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1 faster in some places than others.

- Now, the conditions at the Chem Plant 2
- 3 are very different than those at the RWMC. They
- 4 are examining that problem in our case. We have a
- 5 waste stream that was dissolved in concentrated
- 6 acids. There were several other metals involved
- 7 and how the interaction of these low PHs and the
- 8 other constituents that were present, the site
- 9 specific pathology at the Chem Plant interplays is
- 10 the question we're going to answer.
- We're proposing the Chem Plant put in a 11
- 12 large number of blow holes to try to develop a 3-D
- 13 picture of the contamination on the Tank Farm.
- 14 We're proposing to put in monitoring wells closer
- 15 to those releases than ever before and to sample
- 16 down below this waste and actually go through some
- 17 of the hotter stuff, if we can, at the Chem Plant
- 18 and to get concentrations, plutonium and other
- 19 isotopes, at depth.
- So we're going to look at this 20
- 21 real-world experiment from 1952 when plutonium was
- 22 first released at the Tank Farm to see how far it
- 23 has gone. This whole investigation of the Tank
- 24 Farm has been like peeling an onion. It's
- 25 dangerous stuff there. We think the soils there

1 are as high as 400 REM per hour. If they are that

- 2 high, then a worker would expose -- the drill
- 3 cuttings from that could exceed their institutional
- 4 dose limit in
- 5 13 and a half seconds. So we don't take this
- 6 lightly in going in there. There is a lot of
- 7 safety issues that we will have to resolve before
- we do the investigation. Just a moment.
- DR. RICKARDS: 400 rem per -- I wanted
- 10 the unit.
- MR. JENKINS: Per hour. 11
- DR. RICKARDS: I didn't mean to 12
- 13 interrupt you.
- MR. RENO: I try to maintain my kind of
- 15 thought so I know you're going to be interested in
- 16 this.
- Then we're proposing to do some 17
- 18 laboratory studies to determine plutonium migration
- rates. We're going to look at the chemical -- the
- goechemical environment in the Tank Farm. You
- 21 know, what chemical form for oxidation state is the
- 22 plutonium in and the other isotopes. We're going
- 23 to do column studies. We're going to do batch
- 24 studies, and we're going to answer this question
- 25 once and for all. That is our goal. How fast are

1 these isotopes moving and how fast do we decide how

- 2 to manage it?
- DR. RICKARDS: I notice that you were 3
- 4 looking in at least one of these things at 1000
- years, that is what they look for in Pit 9, right?
- MR. RENO: A thousand years of what?
- 7 For a cap?
- 8 DR. RICKARDS: Yeah.
 - MR. RENO: That number is only
- 10 because -- I mean, how do you design anything to
- last longer than that? That's the question. At a
- 12 minimum of 1000 years is the goal.
- DR. RICKARDS: But that is the trouble 13
- 14 with the plutonium. I mean, when you take it above
- 15 100 nanocuries, they are having to prove a
- 16 10,000-year institutional life. And the more it
- 17 leaks out, the more it meets your ability to leave
- 18 that thousand-year estimate. That is where I think
- 19 the EPA has to step in and say it's inappropriate
- 20 to have low-level standards in this large a
- 21 quantity. If you're dealing with this much waste,
- 22 10 nanocurie standard is fine. If you're dealing
- 23 with billions and billions of these particles and
- 24 slipping them in under the 100-nanocurie standards,
- 25 it's inappropriate to look at the thousand years, I

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think, and inappropriate not to look at the effect
of releasing billions of those to our water supply
to be brought up and inhaled.

Literally, I think that you can put more
plutonium in Idaho through those standards than you
can in New Mexico because they have a 6-million
cubic feet limit.

8 Anyhow, good to see you-all.

9 MR. SIMPSON: Margaret or David, did you 10 have any questions about the aquifer contamination 11 at all?

AUDIENCE MEMBER: I had a question
about drinking water standards, a little bit of
clarification on where the drinking water standards
are to be met. Are they to be met at the source or

16 the INEEL boundary?

MR. JENKINS: I'll tackle that one.

18 What we're looking at, as far as the aquifer, is to

19 restore the entire aquifer drinking water standards 20 by 2095. That, essentially, means anywhere within

21 the aquifer. There is still discussion on whether

22 that includes the area underneath Chem Plant proper

23 or not. And that is a decision that we will

24 memorialize at some point in the Record of

25 Decision.

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AUDIENCE MEMBER: So it's not at the source or at the boundary?

3 MR. JENKINS: It's throughout.

4 MR. JAMES: At least up through the

5 Chem Plant boundary is as far as it will go away

6 from the source.

7 The problem lies, I think, in some of 8 the very immobile things that went down in the 9 injection well or stuck right there. And being 10 immobile, they are hard for us to go and get back.

11 So the least we'll do is meet it at the Chem Plant.

12 MR. JENKINS: Yes.

13 MR. RENO: Based on a point of

14 compliance at the Chem Plant boundary, but it also

15 looked at peak concentrations within the aquifer.

16 MR. JAMES: Right. The high

17 concentrations of the mobile constituents may be

18 moving, for example, the iodine and tritium.

19 MR. JENKINS: The only constituent that

20 is of a concern, long term underneath the
21 Chem Plant proper is the little amount of mercury

22 that was pumped down in the injection well when it

23 was used. In the case of the other constituents of

24 concern, the tritium, it will decay away. The

25 strontium, if we take a few actions we can make it

1 go away. The iodine, the actual hot spot, is south

2 of the Chem Plant, anyway, so that's what I meant

3 by that.

4 AUDIENCE MEMBER: I have a little

5 problem with the iodine. So you're saying even

6 though it's beyond the boundary of the Chem Plant

7 right now, the hot spot...

8 MR. JENKINS: Yes. We're still going to

9 restore that iodine. We're still going to restore

10 the aquifer even though it's outside the Chem Plant

11 fence because it was a release from the Chem

12 Plant.

13 AUDIENCE MEMBER: Mercury is the only

14 other one.

MR. JENKINS: We know there was mercury

16 pumped down there. And when they closed the

17 injection well, they took one sample out of there,

18 and it did have trace quantities of mercury in it.

19 We believe, based on the modeling and how mercury

20 travels in the environment, it's probably isolated,

21 maybe within a couple feet of the injection well,

22 anyway.

23 MR. RAUNING: Trace quantities?

24 MR. JENKINS: I think it was two times

25 the drinking water standard, about two to three

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1 times the MCL that was pumped down there.

2 MR. RENO: There was a one-time

3 incident, it was couple pounds at one time.

4 AUDIENCE MEMBER: So if it's a couple

5 pounds, it gets you mercury?

MR. RENO: Yeah, right.

7 AUDIENCE MEMBER: That was my only other

8 question.

9 MR. SIMPSON: Did you have any other

10 issues or concerns that you want us to go through

11 as far as -- I know you guys were here early during

12 the workshop. Do you want us to go through any of

13 these other slides for you?

4 MR. JAMES: You folks had two questions

15 that I couldn't answer. One was the one that Matt

16 handled about CERCLA and NEPA equivalency. And the

17 other one I can't recall. I know we talked

18 about --

19 AUDIENCE MEMBER: That was my question.

20 MR. JAMES: We did talk about, also, the

21 reason the Tank Farm is being closed under the EIS,

22 the fact that it's an existing facility and the

23 tanks haven't leaked, so it's not really CERCLA.

24 It deals with releases or risks of releases. To

25 the best of knowledge, the tanks themselves haven't

Page 49 1 had any leaks or risks. So they are operational 2 facilities. That is why they are involved in the 3 NEPA process. MR. SIMPSON: Is this format working 5 well for you guys? AUDIENCE MEMBER: Yes. We informally 7 discussed it. I would like to make a couple 8 comments for the record. Regarding the soil 9 repository, which has some name I've forgotten. MR. RAUNING: ICDF. 10 INEEL STAFF: It is my understanding --11 12 I just want to make this for the record that this 13 is a permanent solution forever. That there will 14 be a cap or a liner at the bottom and it will be 15 properly capped and contaminated soils will be 16 placed there, initially, in the old percolation 17 ponds. And we believe that will be safe for a 18 thousand-plus years. It is also my understanding, aside from 19 20 contaminated soil, that other things will go in 21 some of the soil including concrete from breaking 22 up buildings, contaminated equipment, and 23 contaminated structures broken up into bite-size 24 pieces. So that is the intent of that disposal

Page 51 1 quantity of soil, they do, indeed, have room for 2 our soil as well. So, our particular action at TAN 3 is not contingent on the construction of this 4 facility. MR. JAMES: It's also true that the 6 existence of the facility will not be a carte 7 blanche for hog and haul disposal. Every outside 8 WAG 3 source will have to be authorized by their 9 individual ROD to use that facility. MR. RAUNING: And it's only CERCLA waste 10 11 through the CERCLA clean up. AUDIENCE MEMBER: When you say "outside 13 source," do you mean outside --MR. JAMES: Bob, outside of WAG 3. MR. RENO: But within the INEEL. There 15 16 is no off-site waste. AUDIENCE MEMBER: Again, you made the 18 point that there will not be waste brought in from 19 outside of INEEL to go in under any circumstances. MR. JENKINS: Absolutely not. 20 MR. RENO: If there was to be a 21 22 permanent facility in the future, that would be 23 done outside the purview of this process. And it, 24 again, would need to go out for some type of public 25 involvement.

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1 contaminated. The volume will be contaminated 2 soil, but, in particular, if the choice is to tear 3 buildings down, then certainly the debris from 4 those buildings, some or all of it is candidate to 5 go in there. Some cannot go there because of 6 too-high levels of radioactivity to some other 7 place. So the ICDF -- that's what it is -- is a

25 site to probably the majority of things will be

9 generalized disposal facilities. It's also my 10 understanding that it is a centralized facility for 11 other clean up areas, Test Area North in 12 particular, and anything else that does produce 13 soils or debris will go there. They will not have 14 their own separate repositories. That largely is 15 due to economic arguments. I wanted to make that for the record. 16 MR. WILKENING: I do work at the Test

17 18 Area North Site, and MY proposed plan will be out 19 shortly on that. We have a limited volume of soil 20 that we're going to have to deal with out of that 21 site that we will excavate and store on the INEEL. It is, indeed, if this is built, this 22 23 would be a likely candidate for disposal of that 24 soil. We have talked to the folks at the RWMC, and

Page 52 AUDIENCE MEMBER: At present there is no proposal?

MR. RENO: No, there is no proposal for 4 any additional. We can't absolutely rule out

5 someday in the future somebody may come from the

6 state of Idaho with a permit application to say

7 that we want to build a facility for X type of waste.

MR. JENKINS: It would have to be dealt 10 with on its own.

11 MR. WILKENING: Right.

AUDIENCE MEMBER: On Group 4, the 12 13 perched water -- thank you very much for clearing 14 up a lot of that for me. That was pretty foggy in 15 terms of what that was all about. I know it's very 16 complicated.

I noticed some new information that was 18 in your handout that wasn't in the document, is the 19 source of recharged water to the perched water, 20 67 percent percolation pond, the plan is to get rid 21 of them, and 24 percent from the Big Lost River,

22 and that is in rain and snow, 6 percent. It seems

23 to me that says the chances of doing something with

24 the Lost River are pretty high because it is a

25 quarter of the recharge. And so I would point that

25 they do, indeed, have -- since we have such a low

1 out that --

2 MR. RENO: I think that we would agree 3 with that.

AUDIENCE MEMBER: The document says that 5 dealing with the Lost River, which is in Phase 2 is 6 just a probability, but it appears I would say that 7 that is almost an uncertainty, but it looks like it 8 would be quite effective, if you could stop it from 9 raining and snowing it would help a little bit. So

10 that is an observation. Group 6, the gas cylinders, there is no 11 12 doubt in my mind that Alternative 2, dig it up and 13 do the right thing, is still the only thing that 14 should be done. I'm, of course, appalled that gas 15 cylinders were buried to begin with. I know a 16 little bit about that business and why didn't you 17 take the gas cylinders and ship them back to the 18 manufacturer and pick up your five cent per bottle 19 rebate. But that's history. Anyway, let's fix the

20 mistake 100 percent, which, very interesting, is 21 the least expensive approach.

MR. JENKINS: I want to point out one 22 23 thing on there.

24 AUDIENCE MEMBER: That is history.

25 MR. JENKINS: I was going to try to Page 53

1 cleaned up by, probably, 2006, by no later than 2 2006 to 2008.

AUDIENCE MEMBER: But that would be well 4 before any substantive action taken on the main 5 Tank Farm?

MR. JENKINS: Yes.

AUDIENCE MEMBER: I like the removal 8 option because it's kind of a prototype or a pilot 9 of what can be done with the Tank Farm, but you 10 will certainly learn some things pro and con.

And I commend you for recommending

12 that. And its goes well for possibly that solution 13 being a reasonable one for the Tank Farm would be

14 my personal choice at this point. So that's all of

15 my comments and whining. Do you have any more?

16 AUDIENCE MEMBER: Dave covered most of 17 them. I just really, really want to emphasize one

18 of the things that David emphasized was the fact

19 that I don't want to see an interim action on the

20 Tank Farms get so far -- I don't want it to get

21 past the point of no return where you put so much

22 time and so much money into this action that it 23 becomes the final solution when it really shouldn't

24 be the final solution.

25 Because no matter what happens to the

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1 explain part of the reason that shows up so much

2 less costly than, say, No Action. What the No

3 Action involves is, it basically has 100 years of

4 institutional controls and monitoring and all

5 those.

You got small costs spread over a long 6 7 time, which adds up to a significant -- lots of 8 money versus a couple-year project, you go take

9 care of the problem and it's gone.

MR. RAUNING: That industrial gas site, 10 11 too, I think one of reasons that it happened in the

12 first place was it wasn't like the Department of

13 Energy or Atomic Energy Commission or whoever it 14 was at the time that said, "Oh, yeah, you can do

15 that." It was just the subcontractor that finished

16 construction, went out and did it, and nobody 17 stopped him.

18 AUDIENCE MEMBER: But that is water over 19 the damn into the aquifer.

Finally, on Group 7 on this whole tank, 20 21 I'm pleased to see that the solution is to dig it 22 up, dispose of the tank, dispose of the contents of

23 the tank and the sludge and do that. And what is

24 the time schedule on that, fairly roughly? 25 MR. JENKINS: We would have that one

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1 entire site, there is going to be a tremendous

2 amount of waste remaining over our aquifer, even

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3 when it's called clean up, cleaned up, and that

4 also is a great worry. So I always come back to

5 that, where are we when we get there?

MR. RENO: I think as long as the 7 Tank Farm contamination is as severe as we

8 understand it to be, unless we find out there is

9 some radically different information there, and as 10 long as there is a Federal Facility Agreement, but

11 the Tank Farm will receive some additional work

12 under a subsequent Record of Decision, a final

13 Record of Decision.

14 MR. JENKINS: I guess what I would say 15 is we will give it an objective evaluation.

17 18 19

16

20

21 22

23

24 25

OFFICIAL PUBLIC COMMENT

Nancy Schwartz Reporting 208-345-2773

Г	Page 57	T	P 50
1			Page 59 of any.
	we have to have an official comment period	2	•
	session. Would you guys like to make a comment for	1 -	MR. SIMPSON: Thanks for your involvement. We appreciate it.
	the record, so to speak, so that the agencies will	4	MR. RAUNING: It takes a lot of time and
	respond to your comment in the Responsiveness	1	
	Summary?		energy to do what you're doing. We're glad that
1 7	•	J _	you're here.
	we were doing?	7	(Marting construit 1 of 0.45 cm)
9		8	(Meeting concluded at 8:45 p.m.)
1 -	transcript and pull out your comments and respond] <u>9</u>	
	to them, if that's okay with you?	10	
12	· · · · · · · · · · · · · · · · · · ·	11	
1	make sense. It's been kind of an informal session	12	
		13	
	and a lot of it I've gotten a satisfactory response on a lot of them.	14	
		15	
16	· · · · · · · · · · · · · · · · · · ·	16	
1	responses already written for you.	17	
18		18	
19		19	
20		20	
21	,,	21	
1	comments are always welcome.	22	
23		23	
1	most successful kind of set-up so far. I know you	24	
25	can't do it with a room full of people, but for	25	
	Page 58		Page 60
1	this crowd.	1	STATE OF IDAHO)
2	MR. SIMPSON: It makes more sense than	2) ss.
3	doing a formalized presentation. I think you get	3	County of Ada)
4	better interaction when you're talking to us	4	I, NANCY SCHWARTZ, a Notary Public in
5	directly in a round table session.	5	and for the State of Idaho, do hereby certify:
6	AUDIENCE MEMBER: We have read this in	6	That said hearing was taken down by me
7	detail so it's not new.	7	in shorthand at the time and place therein named
8	MR. JENKINS: I hope we answered your		and thereafter reduced to computer type, and that
9	questions.		the foregoing transcript contains a true and
10		10	
11	The formal session was very good. It isn't easy.	11	best of my skill and ability.
12	I just the whole business with the injection	12	I further certify that I have no
13	well and all that stuff that you gave was very,	13	
14	very useful. Now I understand. Frankly, I really	14	WITNESS my hand and seal this 30th day
15	didn't understand it.	15	of December, 1998.
16	MR. SIMPSON: I just wanted to remind	16	Maney Achwal
17	you that the comment period is open until	17	Nancy Schwarz, Notary Public in and for the
	· ·		
18	December 22nd. We would be willing to do a	18	State of Idaho
			State of Idaho My commission expires:
19	December 22nd. We would be willing to do a	19	My commission expires:
19 20	December 22nd. We would be willing to do a briefing if you guys have some questions during	19	My commission expires:
19 20 21	December 22nd. We would be willing to do a briefing if you guys have some questions during your further review of the documents. You can call	19 20 21	My commission expires:
19 20 21 22	December 22nd. We would be willing to do a briefing if you guys have some questions during your further review of the documents. You can call me. I can leave my number after this, but we would	19 20	My commission expires:
19 20 21 22	December 22nd. We would be willing to do a briefing if you guys have some questions during your further review of the documents. You can call me. I can leave my number after this, but we would be willing to do a briefing if you want more	19 20 21 22	My commission expires:

					alls, Idaho, 1	<u>1/16/98</u>
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